

Short Project Proposal

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I think our project will be more like the empirical one. The project will mainly focus on evaluating the proposed ODE-based model and machine learning based model to find out which one has better performance. We will choose three to five models for both ODE-based model and machine learning based model and try to calibrate the parameters for each one. By observing and evaluating the output, we think that we can know the pros and cons of each model and can give out our ideas about what model can best describe Covid-19 and what range of data should we use to make the model have best performance.

We want to use the Covid-19 dataset constructed by NY Times. Since it's a daily updated dataset having the most recent data which can help us to evaluate the performance of the forecasting model more easily. This dataset also contains data about mask usage of each country, which may be the important feature to help us evaluate and train our model.